

Claims

1. Reclining element (10) having a swingable backrest (11), a headrest (12), which is hingedly coupled thereto, and an optional footrest (15), with these swingable components (11, 12, 15) being movable by an electromotive adjustment device including at least one, preferably, threaded spindle (16, 17), which operates a drive motor and thus a profiled element, and at least one adjusting element (18, 19) placed upon the threaded spindle (16, 17) and moveable in longitudinal direction of the threaded spindle, characterized in that the backrest (11) is raised by an articulated lever, which acts like a toggle lever and is linked to the adjusting element (18).
2. Reclining element according to claim 1, characterized in that one lever (20a) of the articulated lever (20) is linked to the adjusting element (18), and that the other lever (20b) is linked to the backrest (11), and that the joint (21) executes a guided linear movement and a rotational movement that leads to a blocking of the articulated lever (20) in a particular position of the lever (20a, 20b), when the adjusting element (18) travels out from the end position.
3. Reclining element according to claim 1 or 2, characterized in that a fixed guide pin (23) is provided in the area of the joint (21) and so supported during the rotational movement of the joint on a stationary slideway (22) that the backrest (11) is swingable in a beneficial position with respect to force application.
4. Reclining element according to claim 3, characterized in that the guide pin (23) is offset in relation to the point of articulation between both levers (20a, 20b) in the direction toward the backrest (11).

5. Reclining element according to claim 3, characterized in that the guide pin (23) and the joint (21) are arranged in concentric superimposed relationship.
6. Reclining element according to one or more of the preceding claims 1 to 5, characterized in that the lever (20a), which is connected to the adjusting element (18), has attached thereto for blockage of the articulated lever (20) a fixed stop (31) which is impacted by the adjusting element (18) proximal area of the lever (20b) linked to the backrest (11), when the two levers (20a, 20b) assume a particular angular disposition.
7. Reclining element according to one or more of the preceding claims 1 to 6, characterized in that the lever (20b) connected to the backrest (11) is supported on a crossbar (25) connecting the side portions of the backrest (11).
8. Reclining element according to one or more of the preceding claims 1 to 7, characterized in that the headrest (12) is swingable by at least one crank mechanism (26, 27).
9. Reclining element according to claim 8, characterized in that the crank mechanism is formed by a crank (26) and a connecting rod (27), that the crank (26) is supported on the side portions of the backrest (11), that one end of the crank (26) is supported on the crossbar (25), and that the connecting rod (27) is articulated to the opposite end of the crank (26).
10. Reclining element according to claim 8, characterized in that the end of the connecting rod (27) opposite to the crossbar (25) is linked to brackets (28) which is fixedly secured to the associated side portion of the headrest (12).

11. Reclining element according to one or more of the preceding claims 1 to 10, characterized in that the headrest (12) upon lifting moves in a particular position against a stop of the backrest (11) such that the backrest can be raised slightly so that the headrest (12) executes a leading movement in relation to the backrest (11) in a manner that upon further raising of the backrest (11) the articulated lever (20) and thus acts like a rigid lever.
12. Reclining element according to one or more of the preceding claims 1 to 11, characterized in that the threaded spindles (16, 17) are driveable by means of a common driving geared motor, and which preferably includes the geared coupling elements for driving one threaded spindle (16 or 17) or both threaded spindles (16, 17).